Amendments to the Claims:

This listing of claims will replace all prior versions, and listings of claims in the application:

Listing of Claims:

1. (Previously presented) A method of refolding an insoluble, recombinant, α(2,3)sialyltransferase (ST3Gal3) protein, wherein the ST3Gal3 protein comprises a maltose binding protein domain (MBD), the method comprising the steps of

(a) solubilizing the insoluble, recombinant, eukaryotic ST3Gal3 protein in a solubilization buffer; and

(b) contacting the soluble eukaryotic ST3Gal3 protein with a refolding buffer comprising a redox couple to refold the eukaryotic ST3Gal3 protein, wherein the refolded eukaryotic ST3Gal3 protein catalyzes the transfer of a sialic acid sugar from a donor substrate to an acceptor substrate.

2. (Previously presented) The method of claim 1, wherein the eukaryotic ST3Gal3 protein is truncated to remove all or a portion of a stem region.

3. (Previously presented) The method of claim 1, wherein an unpaired cysteine in the eukaryotic ST3Gal3 protein is removed by substitution with a non-cysteine amino acid.

4. (Canceled)

5. (Previously presented) The method of claim 1, wherein the ~~first~~ eukaryotic ST3Gal3 protein further comprises a purification domain selected from the group consisting of a starch binding domain, a thioredoxin domain, a SUMO domain, a poly-His domain, a myc epitope domain, and a glutathione-S-transferase domain.

6. (Canceled)

7. (Previously presented) The method of claim 1, wherein the eukaryotic ST3Gal3 protein is expressed in a bacterial host cell as an insoluble inclusion body.

8. (Previously presented) The method of claim 1, wherein a second insoluble, recombinant eukaryotic glycosyltransferase is refolded with the eukaryotic ST3Gal3 protein.

9. (Previously presented) The method of claim 8, wherein a third insoluble, recombinant eukaryotic glycosyltransferase is refolded with the eukaryotic ST3Gal3 protein and the second eukaryotic glycosyltransferase.

10. (Original) The method of claim 1, wherein the redox couple is selected from the group consisting of reduced glutathione/oxidized glutathione (GSH/GSSG) and cysteine/ cystamine.

11. (Original) The method of claim 1, wherein the acceptor substrate is selected from a protein, a peptide, a glycoprotein, and a glycopeptide.

12-13. (Canceled)

14. (Original) The method of claim 12, wherein the donor substrate is a CMP-sialic acid PEG molecule and the acceptor substrate is selected from a protein, a peptide, a glycoprotein, and a glycopeptide.

15-30. (Canceled)